

OPTIONS COURSE

ENGINEERING

ACCREDITING AUTHORITY | Pearson

QUALIFICATION

BTEC Level 1/2 Tech Award in Engineering

FACULTY

ART, DESIGN & TECHNOLOGY

STAFF CONTACT

Mr Gordon, Mr Stringer

WHAT QUALITIES & SKILLS DO I NEED?

You should be enthusiastic and want to learn about Engineering. You need to be well motivated and be able to work independently. Good organisational skills are essential as well as being able to meet common deadlines.

COURSE FOLLOWED

[Engineering](#)

WHAT WILL I DO ON THE COURSE?

The course aims to provide the skills necessary to prepare you for employment in an Engineering environment or for further training at Level 3. This is ideal preparation for you if you wish to choose a Modern Apprenticeship in an Engineering-related occupation. Year 9 will consist of various design and make tasks focussing on the skills and knowledge you will need in year 10 and 11. During year 10 and 11 the units have been developed in consultation with employers and educators, give learners the opportunity to gain a broad understanding and knowledge of the Engineering sector. The course assignments have been design to support progression into a more specialised level 3 vocational or academic course or into an apprenticeship. Please see link below:-

HOW IS THE COURSE ORGANISED & ASSESSED?

The course split over 3 Components. Components 1 and 2 are internally assessed tasks exploring a range of engineering techniques Component 3 is an externally set assignment that will be completed under exam conditions.

Units:

Component 1 - Exploring Engineering sectors and design applications (Internally assessed)

In this Component you will discover the world of engineering. You will investigate the various engineering sectors and explore how they all come together to create products. Through the disassembly of an engineered product you will investigate how the product is made and ultimately produce your own design solutions using a range of CAD and prototyping software

Component 2- Investigating an Engineering Product (Internally assessed)

In this Component you will investigate a manufactured product and learn what considerations a designer would keep in mind when writing a technical specification. You will then plan and produce a part that is linked to the produced you have investigated

Component 3- Responding to an Engineering brief (Externally assessed)

This is the externally assessed component. In this students will be given a set Engineering brief from the exam board. They will then use the skills they've acquired over the entire course to respond to the brief by producing some design proposals and ultimately machining and engineered component.



FREQUENTLY ASKED QUESTIONS

HOW MUCH WRITTEN WORK IS THERE?

There is quite a lot of writing. All the assignments have to be completed in writing or word processed. There are also some mathematical calculations.

DO I HAVE TO WORK MUCH OUTSIDE THE CLASSROOM?

Yes: each Component will require a good deal of research work outside of the classroom

WHAT WILL I MAKE?

You will make a number of engineering components using hand tools, the pillar drill, the metal lathe and the milling machine. These are components used in real engineering applications.

HOW IS THE COURSE ASSESSED?

2 components internally assessed course work, 1 component externally assessed coursework

WHAT WILL I HAVE TO DO IN THE EXAM?

There is no exam for this course

WILL THERE BE ANY ICT WORK?

Yes, you will work with computers on a regular basis to use the internet as a research tool and to complete portfolio work for internal assessment.

HOW MUCH PRACTICAL WORK IS THERE?

There will be a good mix of theoretical work and practical work. Each practical assignment you completed will require and I depth report to meet the assessment requirements.

